

United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE FIRST NAMED INVENTOR		ATTORNEY DOCKET NO.	CONFIRMATION NO.				
10/555,587	03/08/2007	Brian E. Jones	GC800-2-US	4393				
	7590 01/29/2008		EXAMINER					
Janet K Castane Genencor Intern	national Inc		SAIDHA, T	EKCHAND				
925 Page Mill F Palo Alto, CA 9			ART UNIT	PAPER NUMBER				
Talo Allo, CA	,		1652					
			MAIL DATE	DELIVERY MODE				
			01/29/2008	PAPER				

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.



UNITED STATES DEPARTMENT OF COMMERCE Patent and Trademark Office COMMISSIONER OF PATENTS AND TRADEMARKS Washington, D.C. 20231

SERIAL NUMBER	FILING DATE	FIRST NAMED APPLIC	ANT	ATTORNEY DOCKET NO.		
			EXAMINER			
		,	ART UNIT PAPER NUM			

Please find below a communication from the EXAMINER in charge of this application

This application contains sequence disclosures that are encompassed by the definitions for nucleotide and/or amino acid sequences set forth in 37 C.F.R. § 1.821(a)(1) and (a)(2). However, this application fails to comply with the requirements of 37 C.F.R. §§ 1.821-1.825 for the reason(s) set forth on the attached Notice To Comply With Requirements For Patent Applications Containing Nucleotide Sequence And/Or Amino Acid Sequence Disclosures.

APPLICANT IS GIVEN 30 days FROM THE DATE OF THIS LETTER WITHIN WHICH TO COMPLY WITH THE SEQUENCE RULES, 37 C.R.F. §§ 1.821-1.825. Failure to comply with these requirements will result in ABANDONMENT of the application under 37 C.F.R. § 1.821(g). Extensions of time may be obtained by filing a petition accompanied by the extension fee under the provisions of 37 C.F.R. § 1.136. In no case may an applicant extend the period for response beyond the six month statutory period. Direct the response to the undersigned. Applicant is requested to return a copy of the attached Notice to Comply with the response.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Examiner Tekchand Saidha whose telephone number is (703) 305-6595. If the examiner cannot be reached, inquiries can be directed to Supervisory Patent Examiner, Ponnathapu Achutamurthy whose telephone number is (703) 308-3804. The fax number for the organization where this application or proceeding is assigned is (703) 308-4242.

Any inquiry of a general nature or relating to the status of this application should be directed to the Group receptionist whose telephone number is (703) 308-0196.

TEKCHAND SAIDHA PRIMARY EXAMINER

10/555,587

Sequence Listing could not be accepted due to errors.

See attached Validation Report.

If you need help call the Patent Electronic Business Center at (866)

217-9197 (toll free).

Reviewer: Anne Corrigan

Timestamp: Fri Aug 03 11:25:30 EDT 2007

Reviewer Comments:

<210> 2

<211> 1209

<212> DNA

<213> Unknown

<220>

<223> environmental sample

<221> misc_feature

<222> 734

<223> n = A, T, C or G

<400> 2

atggtctggc tgcacggtgg gggctacact atcggcgcag gctcgctgcc gccctacgat 60

ggagcagcct tcgcctcgcg ggatgtagtc ctggtgacgg tgaattaccg tcttggccat 120

ctcggctttt tcgcccatcc ggcgctggat gaagaaaatc cagacggccc ggttcataat 180

ttcgcgcttt tagaccaaat tgctgccctg aaatgggtgc aggaaaatat cgctgctttc 240

ggcggcgacg cggggaatgt cacgctgttt ggcgagtctg ccggggcgcg tagcgtgctt 300

tcgctgctgg cgtcgccgct ggcgaaaaac cttttccaca aaggtattat acaaagcgcc 360

tacacgttgc cggatgtcga caggaagaaa gccctgaaac gtggcgtagc gctggccggt 420

cattacgggc tgcaaaatgc cacagcggat gaactccgcg ctctgcctgc ggatgggctg 480

tgggcgcttg aagggccgct taacattggt ccaacgccaa tctccggcga cgtcgtgctg 540

cctgagccga tgctggatat attcttcgcc gggcgtcagc accgcatgcc cttgatggtc 600

gggagcaaca gcgacgaggc aagcgtgctg agctacttcg gcatcgatcc tgccgggcag

gtcgaactgc tgcgccgggg agcggcgttt ccggactggg ggcttatcaa actgctgtat 720

tcccggagtg aaanggggat gcccgaactc gggcgacagg tgtgccgcga tatggctttt 780

nccncgctgg gttttgttgt gatgcaggcc cagcagcggg tcaatcagcc ctgctggcgc 840

The above <222> response only indicates one "n" location (734); however, n's are also located at 781 and 784: please explain them.

(from Sequence 3)

<221> VARIANT

<222> 245, 260, 261

<223> Xaa = Any Amino Acid

<400> 3

Met Val Trp Leu His Gly Gly Gly Tyr Thr Ile Gly Ala Gly Ser Leu

1 5 10 15

Pro Pro Tyr Asp Gly Ala Ala Phe Ala Ser Arg Asp Val Val Leu Val
20 25 30

Thr Val Asn Tyr Arg Leu Gly His Leu Gly Phe Phe Ala His Pro Ala 35 40 45

Leu Asp Glu Glu Asn Pro Asp Gly Pro Val His Asn Phe Ala Leu Leu 50 55 60

Asp Gln Ile Ala Ala Leu Lys Trp Val Gln Glu Asn Ile Ala Ala Phe 65 70 75 80

Gly Gly Asp Ala Gly Asn Val Thr Leu Phe Gly Glu Ser Ala Gly Ala 85 90 95

Arg Ser Val Leu Ser Leu Leu Ala Ser Pro Leu Ala Lys Asn Leu Phe 100 105 110

His Lys Gly Ile Ile Gln Ser Ala Tyr Thr Leu Pro Asp Val Asp Arg 115 120 125

Lys Lys Ala Leu Lys Arg Gly Val Ala Leu Ala Gly His Tyr Gly Leu 130 135 140

Gln Asn Ala Thr Ala Asp Glu Leu Arg Ala Leu Pro Ala Asp Gly Leu

145					150					133					100
Trp	Ala	Leu	Glu	Gly	Pro	Leu	Asn	Ile	Gly	Pro	Thr	Pro	Ile	Ser	Gly
				165					170					175	
Asp	Val	Val	Leu	Pro	Glu	Pro	Met	Leu	Asp	Ile	Phe	Phe	Ala	Gly	Arg
			180					185					190		
Gln	His	Arg	Met	Pro	Leu	Met	Val	Gly	Ser	Asn	Ser	Asp	Glu	Ala	Ser
		195					200					205			
Val	Leu	Ser	Tyr	Phe	Gly	Ile	Asp	Pro	Ala	Gly	Gln	Val	Glu	Leu	Leu
	210					215					220				
Arg	Arg	Gly	Ala	Ala	Phe	Pro	Asp	Trp	Gly	Leu	Ile	Lys	Leu	Leu	Tyr
225				•	230					235	٠	ſ			240
Ser	Arg	Ser	Glu	Xaa	Gly	Met	Pro	Glu	Leu	Gly	Arg	Gln	Val	Cys	Arg
				245					250					255	
Asp	Met	Ala	Phe	Xaa	Xaa	Leu	Gly	Phe	Val	Val	Met	Gln	Ala	Gln	Gln
			260					265					270		

The above <222> response is incorrect: while Xaa is located at 245, "Phe" is located at 260 (not Xaa). Xaa's are located at 261 and 262.

Validated By CRFValidator v 1.0.2

Application No:

10555587

Version No:

1.0

Input Set:

Output Set:

Started: 2007-08-01 10:04:38.617

Finished: 2007-08-01 10:04:39.579

0 hr(s) 0 min(s) 0 sec(s) 962 ms Elapsed:

Total Warnings:

Total Errors: 8

No. of SeqIDs Defined: 3

Actual SeqID Count:

Error code	Error Description
W 213	Artificial or Unknown found in <213> in SEQ ID (1)
E 342	'n' position not defined found at POS: 1926 SEQID(1)
E 342	'n' position not defined found at POS: 1973 SEQID(1)
E 342	'n' position not defined found at POS: 1976 SEQID(1)
W 213	Artificial or Unknown found in <213> in SEQ ID (2)
E 342	'n' position not defined found at POS: 781 SEQID(2)
E 342	'n' position not defined found at POS: 784 SEQID(2)
W 213	Artificial or Unknown found in <213> in SEQ ID (3)
E 341	'Xaa' position not defined SEQID (3) POS (245)
E 341	'Xaa' position not defined SEQID (3) POS (261)
E 341	'Xaa' position not defined SEQID (3) POS (262)

SEQUENCE LISTING

```
<110> Genencor International, Inc.
      Jones, Brian E.
      Grant, William D.
      Heaphy, Shaun
      Rees, Helen C.
      Grant, Susan
<120> Novel Lipolytic Enzyme LIP1
<130> GC801-2-PCT
<140> 10555587
<141> 2007-08-01
<150>
        PCT/US04/014752
<151>
        2004-05-12
<150> US 60/469,931
<151> 2003-05-12
<160> 3
<170> FastSEQ for Windows Version 4.0
<210> 1
<211> 4313
<212> DNA
<213> Unknown
<220>
<223> environmental sample
<221> misc_feature
<222> 1926, 1973, 1976
<223> n = A, T, C or G
<400> 1
tctatgagca acaaggcggt tttagcgaag cgcaggccga tgagtttgtg gccgaggcgc
                                                                        60
tggaaacatt ccgctggcac cagcacgcaa cggttgacgc cgaaacctac cgcgcgttgc
                                                                       120
atgatgagca ccggctgatc gccgatgtag tctgcttccg tggctgccac attaaccacc
                                                                       180
tgaccccqcq cacqctcqat atcqaccqcq tqcaqtcqct qatqccqqaa cqcqqaatta
                                                                       240
ccccaaaagc cattatcgaa gggccgccgc gccgcgagcg cccgatttta ctgcgccaga
                                                                       300
ccagctttaa agcgctggaa gagcctattt tgttcgccgg tgagcatcac ggaacgcata
                                                                       360
ccgcccgttt cggcgaaata gaacagcgcg gcgtagcgct gacgccgaaa ggccgggcgc
                                                                       420
tgtacgacga actgctgctg gcggcgggca acggcacgga taatctcagc caccagcagc
                                                                       480
atttacacga agtgttcacc gtttcccgga cagcgacgcg ctgctgcgcc gccaggggct
                                                                       540
ggcctatttc cgctatcgtt tgacgcccgt tggcgaaatg caccgccact caatcaagcc
                                                                       600
aggcgacgac ccgcagctgc ttatagaacg cggctggctg gtggcgcagc cggttattta
                                                                       660
tgaagatttc ctcccggtca gcgcggcggg tattttccag tcaaaccttg gcagcgacgg
                                                                       720
cgggcaacgg cagcacggcc attccagccg cagcgagttt gaacaggccc ttggcgcaga
                                                                       780
ggttgcagac gagttcgccc tctatcagca ggccgaggat cgcagtaaac gccgttgcgg
                                                                       840
tttgctgtaa acgcgctacc ctgctggagt gtcagtaaca aggaacagca gatggaacaa
                                                                       900
```

gttgttagcc gttgctcagg ggagactgag cggcgttctt caggggaaag ttgcggtcta

960

```
1020
tegeggeate ceetttgeeg eteegeeggt gggtgaactg egetggeggg cacetegtee
                                                                      1080
cccggcgcac tggcagggta tccgccaggc ggatacattt gcgcctgcat gctggcaaag
cctcgaatac tgcaaagcgg ttggcggcgg cgatcccggc cagttttctg aagattgcct
                                                                      1140
                                                                      1200
gtateteaat atetggaeee eggeeeggeg ggatgeggag eegetgeegg ttatggtetg
                                                                      1260
gctgcacggt gggggctaca ctatcggcgc aggctcgctg ccgccctacg atggagcagc
                                                                      1320
cttcgcctcg cgggatgtag tcctggtgac ggtgaattac cgtcttggcc atctcggctt
                                                                      1380
tttcgcccat ccggcgctgg atgaagaaaa tccagacggc ccggttcata atttcgcgct
tttagaccaa attgctgccc tgaaatgggt gcaggaaaat atcgctgctt tcggcggcga
                                                                      1440
                                                                      1500
cgcggggaat gtcacgctgt ttggcgagtc tgccggggcg cgtagcgtgc tttcgctgct
ggcgtcgccg ctggcgaaaa accttttcca caaaggtatt atacaaagcg cctacacgtt
                                                                      1560
                                                                      1620
gccggatgtc gacaggaaga aagccctgaa acgtggcgta gcgctggccg gtcattacgg
                                                                      1680
gctgcaaaat gccacagcgg atgaactccg cgctctgcct gcggatgggc tgtgggcgct
                                                                      1740
tgaagggccg cttaacattg gtccaacgcc aatctccggc gacgtcgtgc tgcctgagcc
gatgctggat atattcttcg ccgggcgtca gcaccgcatg cccttgatgg tcgggagcaa
                                                                      1800
cagegacgag geaagegtge tgagetactt eggeategat eetgeeggge aggtegaact
                                                                      1860
                                                                      1920
gctgcgccgg ggagcggcgt ttccggactg ggggcttatc aaactgctgt attcccggag
tgaaangggg atgcccgaac tcgggcgaca ggtgtgccgc gatatggctt ttnccncgct
                                                                      1980
                                                                      2040
gggttttgtt gtgatgcagg cccagcagcg ggtcaatcag ccctgctggc gctactattt
                                                                      2100
tgattatgtg ggggaggcgg aacgtaaaat ctatgccaac ggcacctggc acggcaacga
                                                                      2160
agtgccgtat gtttttgaca cgttaagtct gacgccaccc gcaagtgaat acgtcaacca
aaacgatete acgtttgeeg ggeaaatttg tgaetaetgg accegttttg eccgeagege
                                                                      2220
cggtccccac agtaaagcga taccgggccc gctaagctgg cctgcctgcg ttcgcggcaa
                                                                      2280
                                                                      2340
ggaccgaacg atgcggttag gcgttcactc gcgggcgcgg ttcaaagtgg aaaaccgctt
                                                                      2400
tatgcgcatg agaatgcagc tgtttaagcg ggtcatgaag catcacgtca gccttgactg
                                                                      2460
agcaactcat ggcaaaatgc ttcaagcccg gcggcgtgct cgctgccggg tttaaccgcc
agacggtagc ccgcaccggt ttttacactg cgatcaaacg gcctgaccag ccgcccggta
                                                                      2520
                                                                      2580
cgaatatett etgecaceag egttteateg gegatggega teccaaacee etgaatageg
                                                                      2640
gcgctgatgg cgagatccat agtgtcaaaa tgctgatttt tactcattgc ctgccagggc
gcaagaaaac ccggttctgc cagaagtgac cagtcggtgc ggtcccgcgt tgggtgcaaa
                                                                      2700
aatgtcagtc tttcccagcc gctatcttct tttggcagca ggctctggct tacaaccggc
                                                                      2760
                                                                      2820
gtcagcgcct cctcgaacaa cagcgtgccg gttttcgccg actgcccaaa aacaattgcc
                                                                      2880
gcgtcaaacg gctcattttt gaagttcacg ccgtgctcaa cggtcgtggt cagcgcaacc
tgtagctccg gcatgcgttg ttcaagctga atcagctttg gcaccagcca gcgcatcgcg
                                                                      2940
                                                                      3000
caggitiggcg cittaagacg aataatitict ggctigtiggc aggcgcggtc ggctacgtcc
                                                                      3060
agcagattat tgaacgcgct ttgtaattcc gggagcaggg cgctgccctg tggcgtaagg
                                                                      3120
cgcagcccgc gcgcgtggcg ttcaaaaagc gcaaagccaa gccactgttc gagggcggca
attittgcggc tgacggcgcc ctgggtgagg caaagttcct tcgcggccct ggtcaggttc
                                                                      3180
                                                                      3240
aggtgcctgg cgggtgacga gaaaagcgtc cagagtattc aggggaaaat tgcgccgcgt
                                                                      3300
catgatgete teegttgage tatgeatttt ttgcatgget attatgacaa caattegatt
                                                                      3360
gtcgtggcaa tcgcatccgg attgaatagt tatgcaaatc gcatattgtt caggagcggc
tatggccatg caaaccccgg tgcaacatcg ttcaaaactg ccggatgtag gaaccaccat
                                                                      3420
                                                                      3480
atttacggtt atcggtcagc tttccgccca acataaggcg atcaaccttt ctcagggcgc
gcccaacttc ccctgtgacc cgcagcttat tgccggagtc accagggcaa tgcaggaggg
                                                                      3540
gcataaccag tatgcgtcca tgaccggact tgcgtcgctg aaaaatctta ttgctgaaaa
                                                                      3600
                                                                      3660
agtcgcggcg ctttacggct caacctacga tccggcggat gaagtgctgg ttaccgccag
                                                                      3720
cgccagcgaa gggctgtatt ccgctatcgg cggactggta caccccggcg acgaagttat
                                                                      3780
ctatttcgaa ccctcttttg acagctacgc gccgattgtt cggctccagg gcgcaacgcc
ggttgccctt aagctcagcc tgcctgactt caccattaac tgggatgaag tgcgcgctgc
                                                                      3840
                                                                      3900
cataacgccg cgtacccgca tgattattgt caacacgccg cataacccaa gcgggcaggt
                                                                      3960
gttcagcgct catgateteg aaatgctgge ggcgcttace cgtaatacgg atategttgt
cctgtctgac gaagtgtacg agcacatcgt gtttgacgga caaaagcatc acggcatggc
                                                                      4020
cacgcacccg cagcttgccg agcgtagcgt tatcgtttca tcgtttggca aaaccttcca
                                                                      4080
                                                                      4140
tgttaccggc tggcgcgtgg ggtactgcct ggcgcccgcc gcgttgatgg atgagatttg
caaggtgcat cagttcctga tgttttcagc cgatacgcca atgcagcacg cttttgctga
                                                                      4200
                                                                      4260
ttacatgage gateegeaaa ettatetete getggegage etttaceage geaagegtga
                                                                      4313
tttaatgcag tctctgctgg cggagtcgcc attcgagctg ctgccgagcg ccg
```

```
<211> 1209
<212> DNA
<213> Unknown
<220>
<223> environmental sample
<221> misc_feature
<222> 734
<223> n = A, T, C or G
<400> 2
atggtctggc tgcacggtgg gggctacact atcggcgcag gctcgctgcc gccctacgat
                                                                        60
                                                                       120
ggagcagect tegeetegeg ggatgtagte etggtgaegg tgaattaeeg tettggeeat
                                                                       180
ctcggctttt tcgcccatcc ggcgctggat gaagaaaatc cagacggccc ggttcataat
                                                                        240
ttcgcgcttt tagaccaaat tgctgccctg aaatgggtgc aggaaaatat cgctgctttc
                                                                        300
ggcggcgacg cggggaatgt cacgctgttt ggcgagtctg ccggggcgcg tagcgtgctt
tegetgetgg egtegeeget ggegaaaaac etttteeaca aaggtattat acaaagegee
                                                                        360
                                                                        420
tacacgttgc cggatgtcga caggaagaaa gccctgaaac gtggcgtagc gctggccggt
                                                                        480
cattacgggc tgcaaaatgc cacagcggat gaactccgcg ctctgcctgc ggatgggctg
                                                                       540
tgggcgcttg aagggccgct taacattggt ccaacgccaa tetccggcga cgtcgtgctg
cctgagccga tgctggatat attcttcgcc gggcgtcagc accgcatgcc cttgatggtc
                                                                        600
gggagcaaca gcgacgaggc aagcgtgctg agctacttcg gcatcgatcc tgccgggcag
                                                                        660
gtcgaactgc tgcgccgggg agcggcgttt ccggactggg ggcttatcaa actgctgtat
                                                                       720
                                                                       780
teceggagtg aaanggggat geeegaacte gggegaeagg tgtgeegega tatggetttt
nccncgctgg gttttgttgt gatgcaggcc cagcagcggg tcaatcagcc ctgctggcgc
                                                                       840
                                                                       900
tactattttg attatgtggg ggaggcggaa cgtaaaatct atgccaacgg cacctggcac
ggcaacgaag tgccgtatgt ttttgacacg ttaagtctga cgccacccgc aagtgaatac
                                                                       960
gtcaaccaaa acgatctcac gtttgccggg caaatttgtg actactggac ccgttttgcc
                                                                      1020
                                                                      1080
cgcagcgccg gtccccacag taaagcgata ccgggcccgc taagctggcc tgcctgcgtt
cgcggcaagg accgaacgat gcggttaggc gttcactcgc gggcgcggtt caaagtggaa;
                                                                      1140
aaccgcttta tgcgcatgag aatgcagctg tttaagcggg tcatgaagca tcacgtcagc
                                                                      1200
cttgactga
                                                                      1209
<210> 3
<211> 402
<212> PRT
<213> Unknown
<220>
<223> environmental sample
<221> VARIANT
<222> 245, 260, 261
<223> Xaa = Any Amino Acid
<400> 3
Met Val Trp Leu His Gly Gly Gly Tyr Thr Ile Gly Ala Gly Ser Leu
                                    10
Pro Pro Tyr Asp Gly Ala Ala Phe Ala Ser Arg Asp Val Val Leu Val
            20
                                25
Thr Val Asn Tyr Arg Leu Gly His Leu Gly Phe Phe Ala His Pro Ala
                            40
Leu Asp Glu Glu Asn Pro Asp Gly Pro Val His Asn Phe Ala Leu Leu
    50
Asp Gln Ile Ala Ala Leu Lys Trp Val Gln Glu Asn Ile Ala Ala Phe
```

<210> 2

65					70					75					80
Gly	Gly	Asp	Ala	Gly 85	Asn	Val	Thr	Leu	Phe 90	Gly	Glu	Ser	Ala	Gly 95	Ala
Arg	Ser	Val	Leu 100	Ser	Leu	Leu	Ala	Ser 105	Pro	Leu	Ala	Lys	Asn 110	Leu	Phe
His	Lys	Gly 115	Ile	Ile	Gln	Ser	Ala 120	Tyr	Thr	Leu	Pro	Asp 125	Val	Asp	Arg
Lys	Lys 130	Ala	Leu	Lys	Arg	Gly 135		Ala	Leu	Ala	Gly 140	His	Tyr	Gly	Leu
Gln 145	Asn	Ala	Thr	Ala	Asp 150	Glu	Leu	Arg	Ala	Leu 155	Pro	Ala	Asp	Gly	Leu 160
Trp	Ala	Leu	Glu	Gly 165	Pro	Leu	Asn	Ile	Gly 170	Pro	Thr	Pro	Ile	Ser 175	Gly
Asp	Val	Val	Leu 180	Pro	Glu	Pro	Met	Leu 185	Asp	Ile	Phe	Phe	Ala 190	Gly	Arg
Gln	His	Arg 195	Met	Pro	Leu	Met	Val 200	Gly	Ser	Asn	Ser	Asp 205	Glu	Ala	Ser
Val	Leu 210	Ser	Tyr	Phe	Gly	Ile 215	Asp	Pro	Ala	Gly	Gln 220	Val	Glu	Leu	Leu
Arg 225	Arg	Gly	Ala	Ala	Phe 230	Pro	Asp	Trp	Gly	Leu 235	Ile	Lys	Leu	Leu	Tyr 240
Ser	Arg	Ser	Glu	Xaa 245	Gly	Met	Pro	Glu	Leu 250	Gly	Arg	Gln	Val	Cys 255	Arg
Asp	Met	Ala	Phe 260	Xaa	Xaa	Leu	Gly	Phe 265	Val	Val	Met	Gln	Ala 270	Gln	Gln
Arg	Val	Asn 275	Gln	Pro	Cys	Trp	Arg 280	Tyr	Tyr	Phe	Asp	Tyr 285	Val	Gly	Glu
Ala	Glu 290	Arg	Lys	Ile	Tyr	Ala 295	Asn	Gly	Thr	Trp	His 300	Gly	Asn	Glu	Val
Pro 305	Tyr	Val	Phe	Asp	Thr 310	Leu	Ser	Leu	Thr	Pro 315	Pro	Ala	Ser	Glu	Tyr 320
Val	Asn	Gln	Asn	Asp 325	Leu	Thr	Phe	Ala	Gly 330	Gln	Ile	Cys	Asp	Tyr 335	Trp
Thr	Arg	Phe	Ala 340	Arg	Ser	Ala	Gly	Pro 345	His	Ser	Lys	Ala	Ile 350	Pro	Gly
Pro	Leu	Ser 355	Trp	Pro	Ala	Cys	Val 360	Arg	Gly	Lys	Asp	Arg 365	Thr	Met	Arg
Leu	Gly 370	Val	His	Ser	Arg	Ala 375	Arg	Phe	Lys	Val	Glu 380	Asn	Arg	Phe	Met
Arg	Met	Arg	Met	Gln	Leu	Phe	Lys	Arg	Val	Met	Lys	His	His	Val	Ser
385			•		390					395					400
Leu	Asp														